

"What are the Causes and Consequences of Energy Crises in Pakistan"

Outline

1. Introduction

- i. Energy and Energy crises in Pakistan
- ii. Thesis statement

2. An overview of the needs and the production of energy in Pakistan

3. Causes of Energy Crises in Pakistan:

- i. Pakistan loses billions annually because of line-losses
- ii. Theft in power sector
- iii. Short term political agendas and political instability
- iv. Corruption in energy related projects
(Rental Power project)
(Case study)
- v. Poor planning
- vi. Unavailability of funds
- vii. Circular Debt
- viii. Over-reliance on fossil fuels.

4. Consequences of Energy Crises in Pakistan:

- i. Loss in industrial sector
- ii. Decline in crops production
- iii. Over-billing
- iv. Energy shortages adversely affects daily life
- v. Energy crises leads to unemployment
- vi. Energy shortfall hinders foreign direct investment.

5. Recommendations to overcome energy crises:

- i. Renew the outdated infrastructure
- ii. Strict laws are to be made against theft
- iii. Long term strategy to tackle Energy Crises
- iv. Inclusivity in energy related projects
- v. Focus on renewable energy

6. Conclusion

Essay:

To fulfill the daily activities in the world every-thing needs energy and when energy become inefficient it adversely interrupts the daily life. Such as energy crises in Pakistan has inserted significant impacts on socio-economic activities. There are numerous factors which are responsible such as: line losses, theft in power sector, political instability, poor planning, mounting circular debt and over-reliance on fossil fuels. Moreover, this energy crises has drastically impacted Pakistan's economy like Pakistan has lost billions in industrial sector, decline in crops production as well as hindered foreign direct investment, moreover, it has severely impacted social life like people are facing issue like over-billing, water shortage and unemployment.

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Pakistan has been facing energy crises for last three decades. Various initiatives have been taken to overcome the energy crises but still it is same. Country fulfill its energy needs through different sources such as 58% from Thermal, 25% hydro, 8.6% nuclear energy and 6.8% from other sources such as solar and wind.

Furthermore, Here are various factors which have contributed in energy crises such as line losses. Pakistan has lost \$91 billion due to line losses in 2023-24. Pakistan has old transmission and distribution infrastructure, which has inefficient capability to supply electricity to the households and industrial sector; Transmission and distribution infrastructure which are working now, only supplies 27000 mega watt in peak summer.

while demands 30,000 mega watt, therefore, 3000 megawatts of electricity are still short which leads to load shedding.

Similarly, Pakistan has institutions to control irregularities in power sector, but due to corruption and political influence the law and enforcement agencies do not perform their duties well. Therefore, country has been losing 20% to 30% in ~~financial~~ ~~loss~~ electricity revenue due to theft.

According a report, Pakistan has lost 476 billion in eleven month (2024-2025) and 583 million lost per day. Power theft is occurred through illegal connection, tampering in meter and non-payment of bills, which increases corporate ~~debt~~ debt, in result, transmission and distribution companies are unable to pay the power producers on time, which ultimately results in the form of energy shortage.

Moreover, a country performs its functions well when there is political stability. Such as Pakistan is struggling with political turmoil as well as short term agendas of ruling parties further exacerbate the energy crises in Pakistan. Despite to focus on long term planning government prioritizes short term agendas due to its political interest. Resultantly it leads to energy crises.

Furthermore, those nations achieve their goals which do their ~~work~~ duties with honesty and justice. When a nation becomes corrupt and ~~the~~ its leaders do not perform their duty with honesty and justice then it becomes eliminated forever. Such as various governments made numerous attempt to tackle energy crises in country but due to negligence and corruption in power projects they did not get success for

example, ppp government started Rental power project to overcome energy crises, it did not ~~get~~ complete on time because of corruption in this project.

Furthermore, a investigation report submitted to supreme court, which revealed that this project ~~was~~ allegedly awarded to Rental power companies, without any competitive bidding. Later former prime minister Raja pervez Ashraf and others were accused in this project. Hence, corruption is a curse for country, as well as in energy crises it is hindering the efforts to control the energy crises.

Similarly, a society or even a country achieves its goals through proper planning, and on the other hand, poor planning and short term agendas lead to disintegration, such as Pakistan has been struggling with energy shortages for many years.

It is due to its poor planning to tackle energy ~~and~~ shortfall. Pakistan has high potential in thermal and hydroal to overcome energy crises, but due to poor planning, short term agendas of political parties have further exacerbated the energy crises.

Additionally, for proper functioning of any project or scheme there is a need of funds, when the funds are unavailable then the project or any scheme does not perform ~~their~~^{its} functions well. Like in Pakistan, many projects have started to reduce the energy shortfall, but due to unavailability of funds these projects still have not been completed. Resultantly, government is facing difficulties due to the energy crises.

Moreover, when transmission and distributions companies do not perform their duties with honesty and justice, and

show negligence, then its results come out in the form of debt, because, when distributions companies do not collect bills on time then they do not pay payment to power producer companies, resultantly, the circular debt increases. like in Pakistan, circular debt has increased 450 billion to 1.48 trillion from 2013 to 2024. As a result, power producers do not ~~po~~ generate electricity which is needed.

As well as, Pakistan has high potential for renewable energy. In early 1980s state ~~had~~ was generating 60% from hydro, ~~state~~ but with the passage of time government shifted focus toward fossil fuel ~~to~~ for power generation. ~~to~~ Furthermore, Pakistan produces very less amount of oil ~~and~~ and gas, and imports 80% fossil fuel from other countries such as Saudi Arabia, Qatar and UAE and whenever, supply of fossil fuels suspends due to political turmoil ~~and~~ or war

it result in the form of high ~~tar~~ tariffs which is imposed by the government to pay payment to the donors. As a result when government does not pay the payment on time, then the supply of fossil fuels is suspended, which ultimately increases the energy shortages.

Energy Shortfall has inserted drastic impacts on economy such as industrial sector contributes 19% to Pakistan's GDP, but due to shortage of energy the sector ~~could~~ not perform well, in 2022, 60% exports had been fallen due to shortage of energy and government had boreed billions of loss. As well as high tariffs also increased the products cost which make Pakistani products less competitive in global markets.

Additionally, Pakistan is a agricultural country, and Pakistan's economy largely depends on agriculture, it contributes 25% to 30% to GDP and 43%

labours work in agriculture sector, but due to energy shortages, it ~~is~~ ^{has} severely damaged the agriculture sector, farmers cannot irrigate the ~~low~~ crops due to energy shortage. As a result crops production are ~~reduced~~ reduced, because tubewells and other agricultural related ~~mechanism~~ machinery depends on electricity and fossil fuel and when frequent load shedding occurs it disturbs the irrigation system, as a result ~~farmers~~ farmers and as well as government are experiencing huge loss.

Moreover, when a country has peace and stability, it attracts foreign investment in the country, foreign investors bring investment in which state, which has peace and energy efficiency while a country like palestine is struggling with energy crisis which distract the foreign investors.

Furthermore, energy shortage has drastically impacted social life, such as load shedding has interrupted the daily activities; students cannot do their studies, & people faces high temperatures, heat waves which adversely effect on human health.

Similarly, high tariffs on electricity and gas which further exacerbates the problems of citizens, because majority of the population ~~is~~ living below the poverty line therefore they cannot pay bills, ~~as a~~ result.

As well as, government wants to reduce the fiscal deficit therefore, it has imposed extra charges on bills. As a result government has faced country wide protest against overbilling, and over billing will further demoralize the law abiding citizens, ~~which~~ to who have been paying bills on time.

In addition, ~~most~~ the majority of the class works in energy related sectors, and ~~therefore~~ due to energy shortage and high tariffs many sectors do not perform their function well. As a result many workers ~~lost~~ loss their jobs. Such as in Pakistan, many workers who were working in factories and ~~ag~~ in agriculture sector, have lost their jobs. According to International Labour Organization (ILO) report, in 2023, 5 to 6 million people ~~lost~~ ^{had} lost their jobs due energy shortfall, because many industries have been closed due to high tariffs on electricity and gas. As a result ~~many~~ unemployment has increased.

There are some recommendations through which government can reduce the energy shortfall such as Pakistan has outdated infrastructure, to increase the capacity of transmission lines government must focus

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on modern tools, renew the old infrastructure and install modern technology like digital meter, and use of technology for grid upgradation to overcome energy crises.

Furthermore, strict laws should be made to control power theft. Government has been bearing huge financial loss due to theft. In a ~~recent~~ report, government has lost 591 billion rupees. Therefore, to control ~~the~~ power theft there should be strict laws and punishment.

Similarly, to eradicate this issue forever, government should take long term strategy. Therefore such projects should be initiated which solved the energy crises issue forever, and political parties should change the mentality of self interest, and should focus on the interest of citizens.

Moreover, every projects which is initiated by the government, must be from corruption, because such cases have been

reported in the past like corruption in Rental power projects, and Sh. Sahiwal coal project. Therefore, government must focus on the inclusivity of the project.

In addition, Pakistan obtains most of the energy from fossil fuel which is very costly. Therefore, government must divert its interest toward renewable energy. Pakistan has high potential in renewable energy.

Pakistan can produce thousands of mega watts from hydro. Therefore, government should establish new hydro projects and also ~~control~~ concentrate on the refurbishment of old projects like ~~Tarbela~~ the upgradation of Tarbela and Mangla dam energy projects, government can be able to generate more electricity from these projects.

As well as country can million mega watt from thermal and wind energy. Pakistan has significant thermal potential, particularly in the region with active tectonic

plates. government can build energy generation plants in these areas and can produce stable and continuous source of energy.

Moreover, wind energy is one of the important source of ~~energy~~ renewable energy and Pakistan has high potential, it can generate 2.5 million megawatt energy from wind. Therefore, the government should focus on ~~renew~~ wind energy, and establish projects in coastal ~~areas~~ and in desert areas, to eradicate the energy crisis permanently.

In conclusion, to perform daily activities the energy is required, when energy becomes scarce, it adversely affects the daily life. There are numerous factors which contribute in energy crises such as line losses, theft, circular debt, political instability, and over-reliance on fossil fuels. Consequently,

it inserted drastic impacts on socio-economic lives of Pakistanis citizens. Such as industrial loss, decline in crops production, over billing, unemployment, and hindering foreign direct investment and here are some measures through which the government can control energy shortage forever.

“End”